

> d his full

(FILE 'HOME' ENTERED AT 11:47:58 ON 27 JUN 2003)

FILE 'REGISTRY' ENTERED AT 11:48:44 ON 27 JUN 2003
E 3-ISOTHIAZOLONE/CN

L1 1 SEA ABB=ON PLU=ON 3-ISOTHIAZOLONE/CN
D L1

FILE 'CAPLUS' ENTERED AT 11:49:44 ON 27 JUN 2003

L2 251 SEA ABB=ON PLU=ON 3-ISOTHIAZOLONE
L3 313 SEA ABB=ON PLU=ON L1

FILE 'REGISTRY' ENTERED AT 11:50:25 ON 27 JUN 2003

E POLYHEXAMETHYLENEBIGUANIDINE/CN

E POLYHEXAMETHYLENEGUANIDINE/CN

L4 1 SEA ABB=ON PLU=ON POLYHEXAMETHYLENEGUANIDINE/CN
D L4

FILE 'CAPLUS' ENTERED AT 11:51:28 ON 27 JUN 2003

L5 92 SEA ABB=ON PLU=ON L4
L6 1 SEA ABB=ON PLU=ON L4 (P) (PHOSPHATE OR PHOSPHORIC) (5A)
SALT
D L6 IBIB KWIC
L7 0 SEA ABB=ON PLU=ON L3 AND L5
L8 51 SEA ABB=ON PLU=ON (L3 OR L5) (P) (ANTIBACTERIAL OR BIOCIDAL
OR BACTERICIDAL OR FUNGICIDAL OR ANTI-PROTOZOAL OR ANTI-ALGAL
OR ANTIMICROBIAL)
L9 4 SEA ABB=ON PLU=ON L8 AND (COMBINATION OR MIXTURE OR SYNERGY
OR ADDITIVE) (P) (L3 OR L5)
L10 10 SEA ABB=ON PLU=ON L8 AND (COMBINATION OR MIXTURE OR SYNERGY
OR ADDITIVE) (P) (ANTIMICROBIAL OR ANTIBACTERIAL OR ANTIFUNGAL
OR BIOCIDAL OR BACTERICIDAL OR ANTI-PROTOZOAL OR ANTI-ALGAL)
D 10 IBIB KWIC 1-
D L8 IBIB 1-
L11 11 SEA ABB=ON PLU=ON (POLYHEXAMETHYLENEGUANIDINE) AND (SALT OR
DERIVATIVE) (P) (PHOSPHATE OR PHOSPHORIC OR PHOSPHOROUS)
D L11 IBIB KWIC 1-

L17 ANSWER 5 OF 19 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1995:618102 CAPLUS
DOCUMENT NUMBER: 123:17526
TITLE: Cosmetic and pharmaceutical compositions containing antimicrobial phosphate esters
INVENTOR(S): Nelson, Dennis George Anthony; Hayes, Jeffrey Charles
PATENT ASSIGNEE(S): Procter and Gamble Co., USA
SOURCE: PCT Int. Appl., 18 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 9508920	A1	19950406	WO 1994-US10534	19940916
W: CA, CN, JP				
RW: AT, BE, CH, DE, DK, ES, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE				
EP 721300	A1	19960717	EP 1994-929236	19940916
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IE, IT, LI, LU, NL, PT, SE				
CN 1132467	A	19961002	CN 1994-193614	19940916
JP 09502998	T2	19970325	JP 1994-510343	19940916
PRIORITY APPLN. INFO.:			US 1993-129533	19930929
			WO 1994-US10534	19940916

OTHER SOURCE(S): MARPAT 123:17526
IT 55-56-1D, Chlorhexidine, phosphate esters 67651-57-4
RL: BUU (Biological use, unclassified); THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(cosmetic and pharmaceutical compns. contg. antimicrobial phosphate esters)

L16 ANSWER 2 OF 2 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1998:116050 CAPLUS
DOCUMENT NUMBER: 128:132286
TITLE: Buccal solutions for teeth and mouth care containing chlorhexidine salts
INVENTOR(S): Cardon, Chris
PATENT ASSIGNEE(S): Cardon, Chris, Belg.
SOURCE: Eur. Pat. Appl., 5 pp.
CODEN: EPXXDW
DOCUMENT TYPE: Patent
LANGUAGE: French
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 815832	A2	19980107	EP 1997-870096	19970701
EP 815832	A3	19980902		
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, FI				
BE 1010402	A6	19980707	BE 1996-605	19960701
PRIORITY APPLN. INFO.:			BE 1996-605	19960701
AB Buccal solns. for teeth and mouth care contg. chlorhexidine salts , zinc chloride, phosphates and fluorides are claimed (no data).				

WEST Search History

DATE: Friday, June 27, 2003

<u>Set Name</u>	<u>Query</u>	<u>Hit Count</u>	<u>Set Name</u>
side by side			result set
	<i>DB=USPT,PGPB,JPAB,EPAB,DWPI; PLUR=YES; OP=OR</i>		
L11	(polyhexamethyleneguanidine) same (salt or derivative) same (phosphoric or phosphate or phosphonate or phosphorus)	0	L11
	(polyhexamethyleneguanidine or phmb or		
L10	polyhexamethylenebiguanidine) same (salt or derivative) same (phosphoric or phosphate or phosphonate or phosphorus)	12	L10
L9	polyhexamethyleneguanidine same polyhexamethylenebiguanidine	1	L9
L8	polyhexamethyleneguanidine	0	L8
L7	polyhexamethyleneguanidine same polyhexamethylenebiguanidine (polyhexamethyleneguanidine or phmb or	0	L7
L6	polyhexamethylenebiguanidine) same (salt or derivative) same (phosphoric or phosphate or phosphonate or phosphorus)	12	L6
	(polyhexamethyleneguanidine or phmb or		
L5	polyhexamethylenebiguanidine) same (phosphate or salt or derivative or chloride or gluconate or ester)	159	L5
L4	(polyhexamethyleneguanidine or polyhexamethylenebiguanidine) same (phosphate or salt or derivative or chloride or gluconate or ester)	15	L4
	(polyhexamethyleneguanidine or hexamethylenebiguanidine adj5		
L3	polymer) same (phosphate or salt or derivative or chloride or gluconate or ester)	0	L3
L2	(polyhexamethyleneguanidine or polyhexamethylenebiguanidine) adj5 (phosphate or salt or derivative or chloride or gluconate or ester)	4	L2
L1	polyhexamethylene adj5 (phosphate or salt or derivative or chloride or gluconate or ester)	0	L1

END OF SEARCH HISTORY

L8 ANSWER 19 OF 51 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2000:674642 CAPLUS
DOCUMENT NUMBER: 133:223537
TITLE: Antibacterial resin compositions
INVENTOR(S): Park, Heung-soo; Lee, Hyung-bum; Jung, Ho-jin
PATENT ASSIGNEE(S): Korea Chemical Co., Ltd., S. Korea
SOURCE: Repub. Korea, No pp. given
CODEN: KRXXFC
DOCUMENT TYPE: Patent
LANGUAGE: Korean
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
-----	----	-----	-----	-----
KR 9704205	B1	19970326	KR 1992-27237	19921231
PRIORITY APPLN. INFO.:			KR 1992-27237	1992123

L8 ANSWER 27 OF 51 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1999:250583 CAPLUS
DOCUMENT NUMBER: 130:321888
TITLE: Antibacterial and antifungal tatami mats and sheets
for underlays
INVENTOR(S): Funae, Haruyoshi; Nakamura, Munetomo; Tsubakii, Yasuo
PATENT ASSIGNEE(S): Mitsubishi Paper Mills, Ltd., Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 11 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 11107501	A2	19990420	JP 1997-271200	19971003
PRIORITY APPLN. INFO.:			JP 1997-271200	19971003

L8 ANSWER 29 OF 51 CAPLUS COPYRIGHT 2003 ACS
 ACCESSION NUMBER: 1998:214277 CAPLUS
 DOCUMENT NUMBER: 128:286176
 TITLE: Method for enhancing biocidal activity
 INVENTOR(S): Wright, J. Barry; Michalopoulos, Daniel
 PATENT ASSIGNEE(S): BetzDearborn Inc., USA
 SOURCE: U.S., 8 pp., Cont.-in-part of U.S. 5,607,597.
 CODEN: USXXAM
 DOCUMENT TYPE: Patent
 LANGUAGE: English
 FAMILY ACC. NUM. COUNT: 2
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
US 5736056	A	19980407	US 1997-783683	19970115
US 5607597	A	19970304	US 1995-431338	19950428
CA 2171235	AA	19961029	CA 1996-2171235	19960307
ES 2156613	T3	20010701	ES 1996-301835	19960318
NO 9601550	A	19961029	NO 1996-1550	19960419
WO 9831638	A1	19980723	WO 1997-US19741	19971030
W: AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CU, CZ, DE, DK, EE, ES, FI, GB, GE, GH, HU, ID, IL, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, UA, UG, UZ, VN, YU, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: GH, KE, LS, MW, SD, SZ, UG, ZW, AT, BE, CH, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, ML, MR, NE, SN, TD, TG				
AU 9852419	A1	19980807	AU 1998-52419	19971030
AU 725801	B2	20001019		
EP 904252	A1	19990331	EP 1997-947306	19971030
R: AT, BE, CH, DE, DK, ES, FR, GB, IT, LI, LU, NL, SE, IE, FI				
JP 2000507158	T2	20000613	JP 1998-534315	19971030
ZA 9710181	A	19980528	ZA 1997-10181	19971112
NO 9804181	A	19980915	NO 1998-4181	19980911
PRIORITY APPLN. INFO.: US 1995-431338 A2 19950428 US 1997-783683 A 19970115 WO 1997-US19741 W 19971030				
REFERENCE COUNT:	12	THERE ARE 12 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT		

L11 ANSWER 1 OF 11 CAPLUS COPYRIGHT 2003 ACS
 ACCESSION NUMBER: 2003:99729 CAPLUS
 TITLE: Water-diluting composition for bactericidal covers
 INVENTOR(S): Lipovich, V. G.; Livanov, E. V.; Sarylova, M. E.;
 Lipovich, T. V.
 PATENT ASSIGNEE(S): Petrochenko, Aleksandr Anatol'evich, Russia
 SOURCE: Russ., No pp. given
 CODEN: RUXXE7
 DOCUMENT TYPE: Patent
 LANGUAGE: Russian
 FAMILY ACC. NUM. COUNT: 1
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
RU 2189999	C2	20020927	RU 1998-109097	19980514

PRIORITY APPLN. INFO.: RU 1998-109097 19980514
 AB FIELD: paint and varnish industry. SUBSTANCE: invention relates to prep. a bactericidal cover that involves the use a bactericidal component on the base, for example, water-emulsion dyes, water glass or slaked lime. Invention relates to a water-dilg. compn. for bactericidal covers of articles made of ceramics, concrete, brick, stucco and other materials in air medium comprising a water-dilg. dye and **derivs.** of **polyhexamethyleneguanidine** as a bactericidal component. A water-dilg. compn. comprises **derivs.** of **polyhexamethyleneguanidine** as a bactericidal component of the general formula: where R is a base, chloride, **phosphate**; n = 2-60 in the following ratio of components, mas. p. p. : **derivs.** of **polyhexamethyleneguanidine**, 0.5-9; water-dilg. dye, 91-99.5. Invention provides the development of a cover with resistant bactericidal properties and showing the broad spectrum of biocide properties and safety for humans. Invention is used as bactericidal covers for industrial, stores, public, medicinal, residential compartments and constructions, in agriculture and different branches of food industry. EFFECT: improved properties of compn. 3 tbl.

L11 ANSWER 2 OF 11 CAPLUS COPYRIGHT 2003 ACS
 ACCESSION NUMBER: 2002:650477 CAPLUS
 DOCUMENT NUMBER: 138:124249
 TITLE: Polyalkyleneguanidine salt-containing disinfecting detergents
 INVENTOR(S): Gembitskii, P. A.; Efimov, K. M.
 PATENT ASSIGNEE(S): Regional'naya Obshchestvennaya Organizatsiya - Institut Ekologo-Tekhnologicheskikh Problem, Russia
 SOURCE: Russ., No pp. given
 CODEN: RUXXE7
 DOCUMENT TYPE: Patent
 LANGUAGE: Russian
 FAMILY ACC. NUM. COUNT: 1
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
RU 2177499	C1	20011227	RU 2000-120018	20000728

PRIORITY APPLN. INFO.: RU 2000-120018 20000728
 AB A disinfecting detergent comprises a disinfectant, such as chloride or phosphate of **polyhexamethyleneguanidine** or phosphate of poly(4,9-dioxadodecanguanidine) (10-20), a mixt. of a nonionic surfactant (ethoxylated alcs.) and an ionic surfactant (sodium alkylbenzenesulfonate) (10-15%) and water, to the balance. The disinfecting detergents can be used in medicine, veterinary, food industry and for domestic purposes. Thus, a disinfecting detergent comprising **polyhexamethyleneguanidine*** ** **phosphate** (15%) and a surfactant mixt. (15%) of Neonol 9-10 and

Sulfanol was produced.
IT 57029-18-2 89697-78-9, ***Polyhexamethyleneguanidine phosphate 478920-03-5
RL: POF (Polymer in formulation); TEM (Technical or engineered material use); USES (Uses)
(polyalkyleneguanidine salt-contg. disinfecting detergents)

L11 ANSWER 3 OF 11 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:636742 CAPLUS
DOCUMENT NUMBER: 137:170970
TITLE: Polyhexamethyleneguanidine salt-treated antibacterial fibers
INVENTOR(S): Son, Son Won; Ju, Hong Shin; Kitamura, Koji; Otsuki, Toru; Suyama, Tomiyoshi
PATENT ASSIGNEE(S): Daiwa Chemical Industries Co., Ltd., Japan; S K Corporation
SOURCE: Jpn. Kokai Tokkyo Koho, 5 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 2002235282	A2	20020823	JP 2001-75029	20010209

PRIORITY APPLN. INFO.: JP 2001-75029 20010209
TI Polyhexamethyleneguanidine salt-treated antibacterial fibers
AB Title fibers contg. no heavy metals or halogens comprise polyhexamethylene guanidine salt [C₆H₁₂NHC(:NH)NH]_nA, wherein n = .gtreq.1 integer; A = nitric acid, formic acid, acetic acid, benzoic acid, dehydroacetic acid, propionic acid, gluconic acid, sorbic acid, phosphoric acid, fumaric acid, maleic acid, carbonic acid, sulfuric acid, or p-toluenesulfonic acid. Thus, a cotton cloth was treated with 0.3% poly(hexamethylene guanidine) phosphate to give an antibacterial cotton cloth showing good antibacterial effect initially and after 10 times washing.

IT Textiles
(cotton; prepn. of polyhexamethyleneguanidine salt-treated antibacterial fibers)
IT Polyamide fibers, uses
Polyester fibers, uses
RL: BUU (Biological use, unclassified); TEM (Technical or engineered material use); BIOL (Biological study); USES (Uses)
(fabrics; prepn. of polyhexamethyleneguanidine salt-treated antibacterial fibers)
IT Antibacterial agents
(prepn. of polyhexamethyleneguanidine salt-treated antibacterial fibers)
IT Fibers
RL: BUU (Biological use, unclassified); TEM (Technical or engineered material use); BIOL (Biological study); USES (Uses)
(prepn. of polyhexamethyleneguanidine salt-treated antibacterial fibers)
IT Polyamines
RL: BUU (Biological use, unclassified); BIOL (Biological study); USES (Uses)
(salts, antibacterial agents; prepn. of polyhexamethyleneguanidine salt-treated antibacterial fibers)
IT 89697-78-9, Polyhexamethylene guanidine phosphate
RL: BUU (Biological use, unclassified); BIOL (Biological study); USES (Uses)
(antibacterial agents; prepn. of polyhexamethyleneguanidine

salt-treated antibacterial fibers)

L11 ANSWER 4 OF 11 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:499303 CAPLUS
DOCUMENT NUMBER: 137:371403
TITLE: Phosphorus-Containing Salts of Polyhexamethyleneguanidinium for Protection of Metals from Corrosion, Biological Overgrowing, and Salt Deposition
AUTHOR(S): Antonik, L. M.; Lopyrev, V. A.; Korchevin, N. A.; Tomin, V. P.
CORPORATE SOURCE: Siberian Division, Favorskii Institute of Chemistry, Russian Academy of Sciences, Irkutsk, Russia
SOURCE: Russian Journal of Applied Chemistry (Translation of Zhurnal Prikladnoi Khimii) (2002), 75(2), 257-260
CODEN: RJACEO; ISSN: 1070-4272
PUBLISHER: MAIK Nauka/Interperiodica Publishing
DOCUMENT TYPE: Journal
LANGUAGE: English
REFERENCE COUNT: 11 THERE ARE 11 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT
ST polyhexamethyleneguanidinium **phosphate** anticorrosive coating metal biol overgrowing **salt** deposition; bactericidal coating polyhexamethyleneguanidinium **phosphate**
IT 89697-78-9P, **Polyhexamethyleneguanidine phosphate** 103728-45-6P, Guanidine carbonate-hexamethylenediamine copolymer RL: PRP (Properties); SPN (Synthetic preparation); TEM (Technical or engineered material use); PREP (Preparation); USES (Uses) (prep. and performance of polyhexamethyleneguanidinium **salts** for protection of metals from corrosion, biol. overgrowing, and **salt** deposition)

L11 ANSWER 5 OF 11 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:492445 CAPLUS
DOCUMENT NUMBER: 137:326069
TITLE: method of preparing disinfecting agent with improved stability and reduced toxicity by hexamethylenediamine melt condensation with guanidine derivatives and product purification
INVENTOR(S): Lipovich, V. G.; Lipovich, T. V.; Sedishev, I. P.
PATENT ASSIGNEE(S): Polyanov, Oleg Mstislavovich, Russia; Petrochenko, Aleksandr Anatol'evich
SOURCE: Russ., No pp. given
CODEN: RUXXE7
DOCUMENT TYPE: Patent
LANGUAGE: Russian
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
RU 2170743	C1	20010720	RU 2000-107199	20000324
PRIORITY APPLN. INFO.:			RU 2000-107199	20000324
IT 1310-58-3, Potassium hydroxide, reactions	1310-73-2, Sodium hydroxide, reactions			
RL: RCT (Reactant); RACT (Reactant or reagent) (for Polyhexamethyleneguanidine hydrochloride neutralization; method of prep. disinfecting agent with improved stability and reduced toxicity by hexamethylenediamine melt condensation with guanidine derivs. and product purifn.)				
IT 7558-79-4, Disodium hydrophosphate	7558-80-7	7601-54-9, Sodium phosphate	7783-28-0	
RL: RCT (Reactant); RACT (Reactant or reagent)				

(in polyhexamethyleneguanidine hydrochloride transformation to phosphate; method of prep. disinfecting agent with improved stability and reduced toxicity by hexamethylenediamine melt condensation with guanidine derivs. and product purifn.)

L11 ANSWER 6 OF 11 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 2002:113105 CAPLUS

DOCUMENT NUMBER: 136:162718

TITLE: Poly(hexamethyleneguanidine) salt-containing antibacterial odorless detergents with reduced skin irritation for prevention of food poisoning

INVENTOR(S): Son, Son Uon; Ju, Hong Shin; Kitamura, Koji; Tsuri, Takayuki; Suyama, Tomiyoshi

PATENT ASSIGNEE(S): Daiwa Chemical Industries Co., Ltd., Japan; S K Corporation

SOURCE: Jpn. Kokai Tokkyo Koho, 4 pp.

CODEN: JKXXAF

DOCUMENT TYPE: Patent

LANGUAGE: Japanese

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 2002047111	A2	20020212	JP 2000-258164	20000726
PRIORITY APPLN. INFO.:			JP 2000-258164	20000726
ST	antibacterial polyhexamethyleneguanidine detergent prevention food poisoning			
IT	89697-78-9, Poly(hexamethyleneguanidine) phosphate 217642-56-3 393861-25-1 393861-26-2 394204-92-3 394204-94-5 394204-97-8 394204-99-0 394205-04-0 394205-06-2 394205-07-3 394205-11-9 397844-26-7		141655-19-8	
RL:	BSU (Biological study, unclassified); BUU (Biological use, unclassified); NUU (Other use, unclassified); BIOL (Biological study); USES (Uses)			
	(poly(hexamethyleneguanidine) salt-contg. antibacterial odorless detergents with reduced skin irritation for prevention of food poisoning)			

L11 ANSWER 7 OF 11 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 2002:98927 CAPLUS

DOCUMENT NUMBER: 136:152628

TITLE: Polyhexamethylene guanidine salt-treated antibacterial fiber

INVENTOR(S): Son, Son Won; Ju, Hong Shin; Kitamura, Koji; Otsuki, Toru; Suyama, Tomiyoshi

PATENT ASSIGNEE(S): Daiwa Chemical Industries Co., Ltd., Japan; S K Corporation

SOURCE: Jpn. Kokai Tokkyo Koho, 5 pp.

CODEN: JKXXAF

DOCUMENT TYPE: Patent

LANGUAGE: Japanese

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 2002038373	A2	20020206	JP 2000-258163	20000726
PRIORITY APPLN. INFO.:			JP 2000-258163	20000726
AB	The fiber is prep'd. by treating a fiber with a polyhexamethyleneguanidine salt having formula of (C ₆ H ₁₂ NHC(NH)NH) _n .A (n .gt;= 1 integer; A = nitric acid, formic acid, acetic acid, benzoic acid, dehydroacetic acid, propionic acid, gluconic			

acid, sorbic acid, phosphoric acid, fumaric acid, maleic acid, carbonic acid, sulfuric acid, and p-toluenesulfonic acid). Thus, a fiber was prep'd. by immersing a cotton fabric in a 0.25% aq. soln. of **polyhexamethyleneguanidine phosphate** and drying.

ST **polyhexamethyleneguanidine phosphate** antibacterial fiber; acid salt **polyhexamethyleneguanidine** antibacterial agent

IT 89697-78-9, **Polyhexamethyleneguanidine phosphate**
 141655-19-8 217642-56-3 393861-25-1 393861-26-2 394204-92-3
 394204-94-5 394204-97-8 394204-99-0 394205-01-7 394205-04-0
 394205-06-2 394205-07-3 394205-11-9

RL: BUU (Biological use, unclassified); BIOL (Biological study); USES (Uses)
 (polyhexamethylene guanidine salt-treated antibacterial fiber)

L11 ANSWER 8 OF 11 CAPLUS COPYRIGHT 2003 ACS
 ACCESSION NUMBER: 2002:94188 CAPLUS
 DOCUMENT NUMBER: 136:114233
 TITLE: Preparation of antimicrobial wet wipers
 INVENTOR(S): Son, Son Won; Ju, Hong Shin; Minemura, Kimie; Suyama, Tomiyoshi
 PATENT ASSIGNEE(S): Daiwa Chemical Industries Co., Ltd., Japan; S K Corporation
 SOURCE: Jpn. Kokai Tokkyo Koho, 4 pp.
 CODEN: JKXXAF
 DOCUMENT TYPE: Patent
 LANGUAGE: Japanese
 FAMILY ACC. NUM. COUNT: 1
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 2002034828	A2	20020205	JP 2000-258162	20000726

PRIORITY APPLN. INFO.: JP 2000-258162 20000726
 AB Wet wipers are treated with poly(hexamethyleneguanidine) salts for control of bacteria and fungi. Nonwoven fabric was treated with an aq. soln. of poly(hexamethyleneguanidine) phosphate.
 ST wiper bacteria fungi control **polyhexamethyleneguanidine** salt

L11 ANSWER 9 OF 11 CAPLUS COPYRIGHT 2003 ACS
 ACCESSION NUMBER: 2001:690131 CAPLUS
 DOCUMENT NUMBER: 135:231426
 TITLE: Method for disinfecting water from therapeutic and swimming pools
 INVENTOR(S): Efimov, K. M.; Gembitskii, P. A.; Vointseva, I. I.; Zotova, V. I.
 PATENT ASSIGNEE(S): Institut Ehkologo-Tekhnologicheskikh Problem, Russia
 SOURCE: Russ., No pp. given
 CODEN: RUXXE7
 DOCUMENT TYPE: Patent
 LANGUAGE: Russian
 FAMILY ACC. NUM. COUNT: 1
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
RU 2145307	C1	20000210	RU 1999-112325	19990618

PRIORITY APPLN. INFO.: RU 1999-112325 19990618
 AB Disinfecting procedure involves treatment with (a) **polyhexamethyleneguanidine phosphate** salt formed in reaction of exchange decompr. of polyhexamethyleneguanidinium chloride with 40% aq. soln. of diammonium phosphate, or (b)

polyhexamethyleneguanidinium phosphate, or (c) phosphate salt of copolymers of polyhexamethyleneguanidine with higher monoamines. Flow- or recycle-type pool water is treated with above at 0.5-1.5 mg/L. In particular, recycle-type pool water is passed through layer of clinoptilolite treated with mentioned reagent to achieve its concn. 1-2%. Increased reliability of antiseptic protection of pool water and reduced toxicity of reagent including its allergic activity is obtained.

- ST **polyhexamethyleneguanidine phosphate swimming pool water disinfection**
IT 31961-54-3D, **Polyhexamethyleneguanidine, phosphate salts, copolymers with higher monoamines**
RL: BUU (Biological use, unclassified); BIOL (Biological study); USES (Uses)
(method for disinfecting water from therapeutic and swimming pools)

L11 ANSWER 10 OF 11 CAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2000:351312 CAPLUS
DOCUMENT NUMBER: 132:344445
TITLE: Synergistic biocidal composition.
INVENTOR(S): Choi, Ki-Seung; Kim, Jin-Man; Park, Jeong-Ho; Cho, Myung-Ho; Hahn, Soon-Jong
PATENT ASSIGNEE(S): SK Chemicals, S. Korea
SOURCE: PCT Int. Appl., 17 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2000028823	A1	20000525	WO 1999-KR687	19991116
W: AU, CA, CN, JP, US				
RW: AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE				
KR 2000032593	A	20000615	KR 1998-49095	19981116
EP 1133231	A1	20010919	EP 1999-972072	19991116
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, FI				
AU 751719	B2	20020822	AU 2000-11867	19991116
JP 2002529482	T2	20020910	JP 2000-581888	19991116
PRIORITY APPLN. INFO.:			KR 1998-49095	A 19981116
			WO 1999-KR687	W 19991116

REFERENCE COUNT: 2 THERE ARE 2 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

AB The title compn. comprises a 3-isothiazolone I (R = H or Cl) and **polyhexamethyleneguanidine phosphate** [(CH₂)₆NHC(:NH)NH]_m.nH₃PO₄ (m = 4-7; n = 1-14). The biocide compn. not only does not corrode metal, but also has a high instant sterilizing capability, a wide antibiotic spectrum, and superior antiseptic effects. It is usable as a biocide for cooling waters, paints, latexes, cosmetics, emulsions, textiles, leather metal processing fluids and paper industry.

- ST synergism biocide isothiazolone deriv
polyhexamethyleneguanidine phosphate
IT Algicides
Antibacterial agents
Fungicides
(industrial, synergistic; compns. contg. isothiazolone deriv.
and **polyhexamethyleneguanidine phosphate**)
IT Paper
(manuf.; microbicidal compns. contg. isothiazolone deriv. and
polyhexamethyleneguanidine phosphate for)

IT Lubricating oils
 (metalworking; microbicidal treatment by compns. contg. isothiazolone deriv. and **polyhexamethyleneguanidine phosphate**)
 IT Cooling water
 Cosmetics
 Emulsions
 Latex
 Paints
 Textiles
 (microbicidal treatment by compns. contg. isothiazolone deriv. and **polyhexamethyleneguanidine phosphate**)
 IT Biocides
 (synergistic; compn. contg. isothiazolone deriv. and **polyhexamethyleneguanidine phosphate**)
 IT 2682-20-4D, mixts. with **polyhexamethyleneguanidine phosphate**
 26172-55-4D, mixts. with **polyhexamethyleneguanidine phosphate**
 31961-54-3D, **Polyhexamethyleneguanidine phosphates**,
 mixts. with isothiazolone derivs.
 RL: BUU (Biological use, unclassified); BIOL (Biological study); USES
 (Uses)
 (synergistic biocidal compns.)

L11 ANSWER 11 OF 11 CAPLUS COPYRIGHT 2003 ACS
 ACCESSION NUMBER: 1986:200206 CAPLUS
 DOCUMENT NUMBER: 104:200206
 TITLE: **Polyhexamethyleneguanidine phosphate**
 injections with antitumor activity
 INVENTOR(S): Lulle, I.; Lidaks, M.; Paegle, R.; Zidermane, A.;
 Kravchenko, I. M.; Gilev, A. P.; Kagan, T. I.;
 Gembitskii, P. A.; Simkhovich, B. Z.
 PATENT ASSIGNEE(S): Institute of Organic Synthesis, Academy of Sciences,
 Latvian S.S.R., USSR
 SOURCE: Can., 12 pp.
 CODEN: CAXXA4
 DOCUMENT TYPE: Patent
 LANGUAGE: English
 FAMILY ACC. NUM. COUNT: 1
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
CA 1194802	A1	19851008	CA 1982-413032	19821007
PRIORITY APPLN. INFO.:			CA 1982-413032	19821007

TI **Polyhexamethyleneguanidine phosphate injections with antitumor activity**
 AB **Polyhexamethyleneguanidine phosphate**,
 $R(CH_2)_6[NHC(:NH)NH(CH_2)_6]_nR_1 \cdot (H_3PO_4)^{n+2}$, [R, R₁ = NH₂, H₂NC(:NH)NH; n = 2-5], has antitumor activity and may be used for the treatment of gastrointestinal and mammary cancer. The compd. has an LD₅₀ in mice of 70 mg/kg, and inhibits the synthesis of DNA, RNA, and protein by tumor cells in vitro, probably by affecting transport of precursors. Equimolar amts. of hexamethyleneguanidine and guanidine-HCl were polymd. at 160-170.degree. for 23 h to produce **Polyhexamethyleneguanidine**-HCl, which was dissolved in EtOH, mixed with 1 equiv. NaOEt, NaCl was removed by filtration, and H₃PO₄ was added to the filtrate. **Polyhexamethyleneguanidine phosphate** was filtered, repptd. from aq EtOH, washed, and dried. The antitumor agent is preferably used in the form of 1.5% injections.

ST **Polyhexamethyleneguanidine phosphate antitumor**
 IT Neoplasm inhibitors
 (**Polyhexamethyleneguanidine phosphate**)
 IT 102265-78-1P

RL: SPN (Synthetic preparation); PREP (Preparation)
(prepn. and conversion of, to **phosphate salt**)

=> d his full

(FILE 'HOME' ENTERED AT 11:47:58 ON 27 JUN 2003)

FILE 'REGISTRY' ENTERED AT 11:48:44 ON 27 JUN 2003
E 3-ISOTHIAZOLONE/CN

L1 1 SEA ABB=ON PLU=ON 3-ISOTHIAZOLONE/CN
D L1

FILE 'CAPLUS' ENTERED AT 11:49:44 ON 27 JUN 2003

L2 251 SEA ABB=ON PLU=ON 3-ISOTHIAZOLONE
L3 313 SEA ABB=ON PLU=ON L1

FILE 'REGISTRY' ENTERED AT 11:50:25 ON 27 JUN 2003

E POLYHEXAMETHYLENEBIGUANIDINE/CN

E POLYHEXAMETHYLENEGUANIDINE/CN

L4 1 SEA ABB=ON PLU=ON POLYHEXAMETHYLENEGUANIDINE/CN
D L4

FILE 'CAPLUS' ENTERED AT 11:51:28 ON 27 JUN 2003

L5 92 SEA ABB=ON PLU=ON L4
L6 1 SEA ABB=ON PLU=ON L4 (P) (PHOSPHATE OR PHOSPHORIC) (5A)
SALT
D L6 IBIB KWIC
L7 0 SEA ABB=ON PLU=ON L3 AND L5
L8 51 SEA ABB=ON PLU=ON (L3 OR L5) (P) (ANTIBACTERIAL OR BIOCIDAL
OR BACTERICIDAL OR FUNGICIDAL OR ANTI-PROTOZOAL OR ANTI-ALGAL
OR ANTIMICROBIAL)
L9 4 SEA ABB=ON PLU=ON L8 AND (COMBINATION OR MIXTURE OR SYNERGY
OR ADDITIVE) (P) (L3 OR L5)
L10 10 SEA ABB=ON PLU=ON L8 AND (COMBINATION OR MIXTURE OR SYNERGY
OR ADDITIVE) (P) (ANTIMICROBIAL OR ANTIBACTERIAL OR ANTI-FUNGAL
OR BIOCIDAL OR BACTERICIDAL OR ANTI-PROTOZOAL OR ANTI-ALGAL)
D 10 IBIB KWIC 1-
D L8 IBIB 1-
L11 11 SEA ABB=ON PLU=ON (POLYHEXAMETHYLENEGUANIDINE) AND (SALT OR
DERIVATIVE) (P) (PHOSPHATE OR PHOSPHORIC OR PHOSPHOROUS)
D L11 IBIB KWIC 1-

FILE 'REGISTRY' ENTERED AT 12:49:11 ON 27 JUN 2003

E ALEXIDINE

L12 6 SEA ABB=ON PLU=ON ALEXIDINE/BI
D L12

E CHLORHEXIDINE

L13 45 SEA ABB=ON PLU=ON CHLORHEXIDINE/BI
D L13

FILE 'CAPLUS' ENTERED AT 12:50:32 ON 27 JUN 2003

L14 100 SEA ABB=ON PLU=ON (CHLORHEXIDINE OR ALEXICIDINE OR POLYAMINOP
ROPYLGUANIDE) (P) (PHOSPHATE OR PHOSPHORUS)
L15 93 SEA ABB=ON PLU=ON (CHLORHEXIDINE OR ALEXICIDINE OR POLYAMINOP
ROPYLGUANIDE) (P) (PHOSPHATE)
L16 2 SEA ABB=ON PLU=ON (CHLORHEXIDINE OR ALEXICIDINE OR POLYAMINOP
ROPYLGUANIDE) (5A) (PHOSPHATE) (5A) (SALT OR DERIVATIVE)
D L16 IBIB KWIC 1-
L17 19 SEA ABB=ON PLU=ON (CHLORHEXIDINE OR ALEXICIDINE OR POLYAMINOP
ROPYLGUANIDE) (5A) (PHOSPHATE)
D L17 IBIB KWIC 1-